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ABSTRACT

The construction and application of innovation configuration in assessing the implementation of adopted/adapted National Diffusion Network (NDN) programs and developmental programs funded by Elementary Secondary Education Act Title IV, Bureau of the Educationally Handicapped and Vocational Education, are presented. Implementation evaluation measures the degree that the program components of the original developer have been installed and are operating in the new site. In searching for a method of determining the status of implementation of adopted programs, the Pennsylvania State Facilitator chose the "Levels of Use" technique, a focused interview (and/or possibly an observation) in which the knowledge of a project or program is placed in a format known as a configuration. The configuration in a developmental program performs a documenting service. As the program goes through the testing phases, it is modified by keeping what works and discarding the rest. Therefore, a number of configurations could be constructed, each documenting a period in time in the developmental history. The innovation configuration can well serve the tools to measure implementation when the tools use descriptive narrative as a basis on which to judge the status of the implementation. (RL)

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Application of Innovation Configurations to Evaluation of NDN and Title IV-C Programs

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This is the third paper in a series of four discussing assessment of program adaptation during implementation. Other papers in the series deal with the concept of innovation configurations as an assessment strategy and a method for documenting program adaptation. The thrust of this segment of the series concerns the construction and application of the innovation configuration in assessing the implementation of adopted/adapted National Diffusion Network programs and developmental programs funded by ESEA Title IV, Bureau of the Educationally Handicapped and Vocational Education. The paper is based on experiences and is presented in a natural observation approach as opposed to an experimental or survey approach. Experiences with configurations noted in the paper are more numerous with National Diffusion Network situations than with the developmental type of programs.

National Diffusion Network

One of the writer's current responsibilities is to carry out the function of the State Facilitator for Pennsylvania for the National Diffusion Network (NDN). The function is to help educators in local school districts, intermediate units, and other educational service agencies learn about exemplary programs which have been validated by the Joint Dissemination Review Panel (JDRP) emanating from the U.S. Department of Education. These include programs developed under funding through the National Institute of Education. The programs also have origins in local districts, educational laboratories and centers and universities and colleges. All of the exemplary programs were developed under federal monies.

In addition to providing an awareness function, a State Facilitator also provides technical assistance in arranging for training, planning for the acquisition of resources, such as materials, funding, space, staff, etc. and planning for monitoring and evaluation of the implementation. In many cases,

both the State Facilitator and the developer of the program share in these responsibilities. The proximity of the State Facilitator to the local adopter suggests that periodic monitoring is more cost effective when done by the State Facilitator. The developers in the NDN serve a nationwide population and usually have a more limited budget than the facilitator. It is possible that only one or two adoptions of a single NDN project may be found in a specific state. Some developers may have only one adoption in a given region of the nation. Therefore, the responsibility for monitoring may fall solely within the realm of the Facilitator.

The National Diffusion Network Division requires that three types of evaluation or monitoring be conducted by participants of the Network. Two of these are directly related to the adopting district. They concern impact and implementation evaluation. The impact data required is based on outcomes or results of testing of the students or teachers who are direct recipients of the services resulting from the adoption of an NDN developer. Implementation evaluation measures the degree that the program components of the original developer have been installed and are operating in the new site. Examples of implementation status delineations are:

Level 1 - Adoption agreement signed; training scheduled or completed.

Level 2 - Key elements in process of implementation.

Level 3 - Key elements implemented.

In an evaluation of the National Diffusion Network in 1976-77, Emrick, Peterson and Argarwala-Rogers (1977) noted that

> "there is a trend for adopters (56%) to be implementing only selected aspects of the innovation rather than the entire innovation...At the same time, adopters will modify methods and materials in what they believe are reasonable ways, so as to make the innovation more consistent or compatible with local conditions." (pp. 116-18)

This trend has been a concern of the Pennsylvania State Facilitator as the aspects selected by the adopter may not be the critical variables or the combination of critical variables on which the original validation results were granted. The Facilitator follows the views of Stallings and Kaskowitz (1974) in their Follow Through Evaluations. The evaluators in this study were among the first to establish a set of procedures to verify that the new program was actually in use before collecting impact data on clients. In the Follow Through study, developers were surveyed for descriptions of what the program should portray when observed in the classroom setting. The presence of these characteristics was then documented in adoption sites.

Implementation Assessment Measure

In searching for a method of determining the status of implementation of adopted programs, the Pennsylvania State Facilitator chose the Levels of Use techniques developed by Gene Hall and Susan Loucks. This technique depends on a knowledge of the program that has been adopted. For state facilitators, this constitutes a possible N of 250 unique program descriptions of an i-depth nature, one for each program validated by JDRP. Most facilitators are realistically dealing with 50 to 100 specific programs. In the Levels of Use technique, which is a focused interview (and/or possibly an observation), the knowledge of a project or program is placed in a format known as a configuration.

The configuration is derived from an investigation of the program by means of interviewing program developers and adopters, reading descriptive information, and/or observing the program first hand in a situation which the developer declares is true to the original program. A configuration described by a developer may be slightly modified by adopters who adapt it to their own unique settings. A certain amount of modification is able to take place without destroying the critical gestalt of the project and, thereby, invalidating the

expected results. Most adopting districts do this. The Rand study called this modification, mutual adaptation, which is defined as

> "an organizational process in which an innovative plan is developed and modified in light of the realities of the institutional setting, and in which the organization changes to meet the requirements of the innovative project." (Berman and McLaughlin, 1975, p. 31).

If critical components are not implemented or are revised so severely that they no longer are representative of the original program, a "drastic mutation" (Hall and Loucks, 1978, p. 13) is declared. Neither the developer nor the facilitator will claim an adoption in this case, since the outcomes of the program in the adopting site are not related to the original intervention. If the results are negative, the report of the adopting site could damage the reputation of the original program which in this case would be unjustified. If they are positive, the mutation which occurred might be the basis for a new innovative program which is producing significant results and should be shared through the Network. An example of this actually happened in Pennsylvania. The following narrative illustrates this case.

Each year the Pennsylvania State Facilitator surveys adopting districts to determine the effectiveness of the facilitator's service and requests from the districts student data directly related to the intervention, (the adopted program). School District X sent in data on a remedial program which was unbelievably high for a secondary school. The facilitator staff decided to use this site as a case study to determine the variables that made this adoption so successful. An observation and Levels of Use Interview based on the configuration developed for this secondary compensatory reading laboratory soon revealed that the district had not adopted that specific program. A combination of federal and district monies were used to implement this adoption. Much of the money was spent on acquiring materials and equipment which this impoverished

district never had. The physical laboratory arrangement, the management system, and the method of instruction of the developer's project had been ignored. These had been critical or necessary components of the developer's program on which the JDRP validation had been granted. No adoption could be claimed here. However, if the implementation check had not been undertaken, it is possible that on the basis of student data this site could have been declared a demonstration site for the original program and interested educators would have visited to see an exemplary adoption of that specific project. That is not to say that after a period of time and evaluation, this could not be done. The modified program, however, should then be validated on its own merits.

NDN Configurations

The configurations used by the Pennsylvania State Facilitator in their assessment of NDN adoptions come from three sources. In two instances they were developed by other agencies. The third source originated with the State Facilitator. Concurrent with the federal regulations to obtain implementation data was a study sponsored by the U.S. Office of Education on the topic of Dissemination. The Procedures for Adopting Educational Innovations (PAEI) Project at the University of Texas at Austin, R & D Center was a sub-contractor in the study. The mission of this group was to determine the status of adoptions in the National Diffusion Network and other federally funded dissemination and diffusion efforts. For their purposes, a series of configurations were needed to determine the fidelity of the adoption. Since their study was nationwide only a sample of Pennsylvania adopters were involved. The Pennsylvania State Facilitator wanted to use similar procedures with a larger population. Thus an agreement to share already constructed configurations was made with the PAEI staff. Facilitators in other areas, such as the District of Columbia began to develop configurations as well.

Figure 1

STATE_____ CITY_____ DISTRICT_____ BUILDING_____ ID#_____ CONFIG_____

COMPONENT CHECKLIST FOR INDIVIDUALIZED LANGUAGE ARTS

Component 1: Diagnosis for Objective & Technique Selection [1]

(1) Conducts diagnosis using teacher-developed diagnosis grid using ILA principles for objectives & technique selection

(2) Conducts diagnosis using ILA example grid for objectives & technique selection

(3) Diagnosis on an informal basis for objective & technique selection

(4) Uses development sequence defined in manual without teacher diagnosis of students

(5) No diagnosis; objectives & technique selection based upon intuition

(6) No diagnosis - no objectives

Component 2: Activity Selection According to Communication Spiral [2]

(1) Uses spiral regularly & sequentially according to objectives

(2) Uses spiral regularly, but not sequentially to achieve objectives

(3) Uses regularly only selected elements of spiral

(4) Uses spiral haphazardly and non-sequentially

(5) Spiral not used

Component 3: Cross Curriculum Use of ILA Principles [3]

(1) Wide variety of writing experience based on ILA principles encouraged in all curriculum areas

(2) Wide variety of writing experience in language arts curriculum area alone

(3) Little variety of writing experience in languages and/or other curriculum areas

(4) Writing experiences based on workbook and/or ditto sheet activity

(5) No writing experience in any curriculum area

Anything to the right of the solid line is unacceptable. Anything to the left of the solid line is acceptable. Anything to the left of the dashed line is ideal.

*See Pg. 3 for Key & Explanations.

The PAEI staff, affectionately called the DESSI staff, after the title of the larger study derived their configurations from interviews with developers and adopters of NDN programs. The format of these configurations was an array or matrix of the critical and related components of a program. Critical components are those core of components which must be present for the innovation to be in use. Related components are of secondary importance; they enhance the program, but if they are eliminated the program will still result in a significant growth level for students involved.

The matrix was divided into three areas for each component: ideal, acceptable and unacceptable. Each of these areas described critical types of teacher and student behavior which could be observed in the classroom or other setting in which the program takes place. An example of this matrix can be found in Figure 1. The matrix is delineated by dashed and solid lines. The dashed lines separate the ideal behaviors (to the left) from the acceptable (in the middle). The items listed to the right of the solid line indicate unacceptable behavior.

The District of Columbia Facilitator used a survey method to obtain data for configurations. A form containing three questions was mailed to all developers whose projects had been adopted in the district. The answers to the form were submitted in descriptive narrative. The questions are listed in Figure 2.

Figure 2

Q1 - What are the key components of the program?
Q2 - What are critical types of teacher and student behavior?
Q3 - What should be observed in the classroom?

This data could be formatted in the same manner as the matrix, or a checklist could be constructed. Both formats have advantages and disadvantages. The

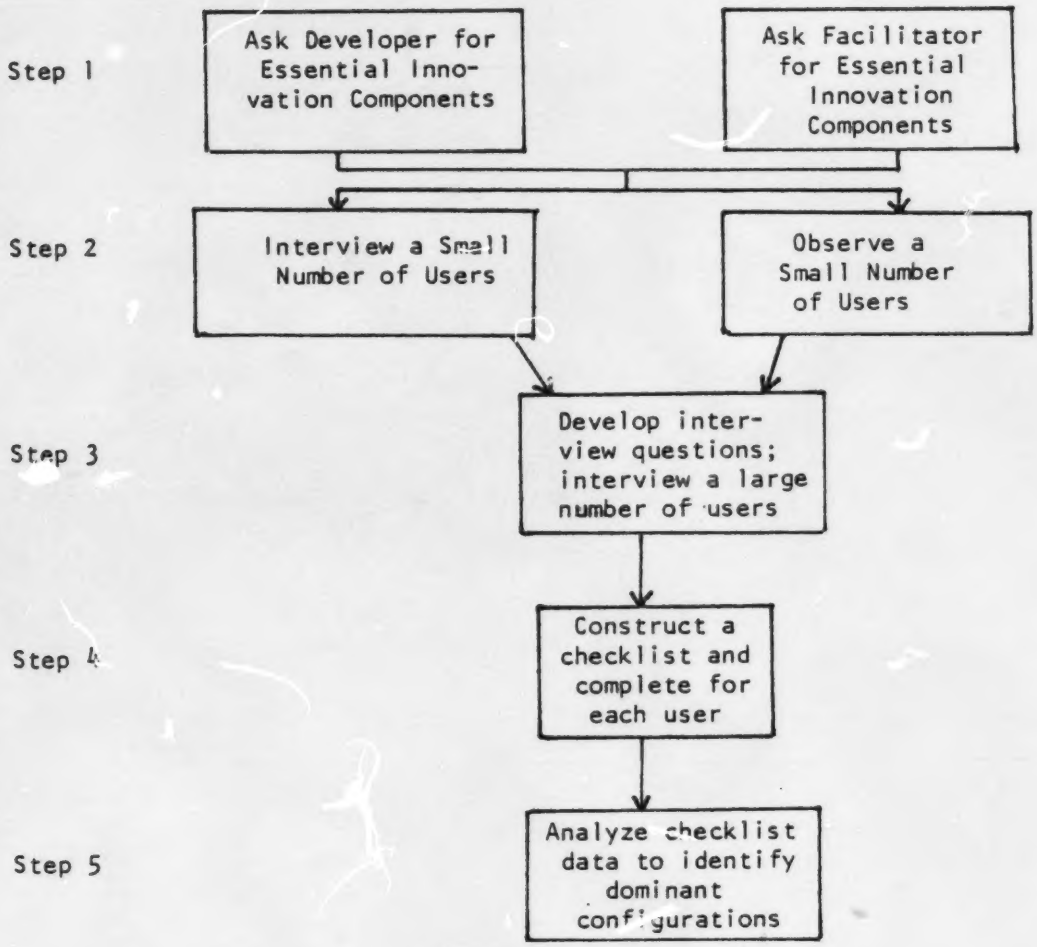
matrix has space limitations if the program has several variations in the acceptable column. Another problem is that the evaluator must devise some system of denoting absence or presence of the components and variations which have not been listed as either acceptable or unacceptable. The checklist, which provides more room for variations lacks the compacting feature. This is particularly important for the facilitator who uses the configuration for observation purposes. The matrix can be easily scanned for absence or presence of behaviors without shuffling papers on which a series of checklists are printed.

The Pennsylvania Facilitator constructed configurations for National Diffusion Network programs with information gained from interviewing the program developer and by reading descriptive materials. The questions found in Figure 2 were arrayed in a matrix format for the interviews conducted by the Pennsylvania State Facilitator. The availability of information on individual programs which is housed at the Facilitator project, aided the Facilitator in building the configurations. In addition, facilitators usually attend all NDN awareness and training sessions in their state. Thus they accumulate data through a variety of means, i.e. print, observational, audio-visual etc. Unfortunately, many times developers concentrate on the implementation requirements of a project in their descriptive materials and presentations, and less on how the project or program should actually function in the adopting site. Facilitators who wish to construct configurations should be able to discriminate between these observable effects and activities and implementation requirements.

In addition to utilizing the information of the developer, facilitators may interview adopters of exemplary programs for their perceptions of the critical and related elements of the components. An example of the procedures to follow in identifying a configuration are found in Figure 3.

Figure 3

A Procedure for Identifying Configurations


Step 1
Ask Developer for Essential Innovation Components
Ask Facilitator for Essential Innovation Components
Step 2
Interview a Small Number of Users
Observe a Small Number of Users
Step 3
Develop interview questions; interview a large number of users
Step 4
Construct a checklist and complete for each user
Step 5
Analyze checklist data to identify dominant configurations

Of the thirty-three configurations currently available at the Pennsylvania State Facilitator's office, fifteen were obtained from the DESSI staff. Six of the configurations were results of the District of Columbia Facilitator's survey. Two of the ten developed by the Pennsylvania State Facilitator were completed prior to the Dissemination study and were given to the DESSI staff for refinement. One configuration was developed independently by the facilitators in both Pennsylvania and the District. Five configurations were developed by both the District Facilitator and the DESSI staff independently. A list of the National Diffusion Network configurations by source are found in Table 1.

There are essentially two types of offerings in the National Diffusion Network, those with a program or content emphasis and those with a process emphasis. Content programs are more numerous. All NDN programs have a training segment, although some are entirely staff development oriented. A review of twenty configurations for the types of components included revealed differentiation in the nature of the components between these two types. The review also revealed the thrust of the component as arrayed in rank order in Table 2. Again the heavy emphasis of the instructional program is evident in this illustration.

As Table 2 indicates, the most frequent component noted was that of instructional strategy. In observations, the evaluator would be searching for a particular set of behaviors on the part of the teacher. Examples of this might be cueing, wait time, use of high or low order questions, positive reinforcement, timing, etc. The second highest component was that of pre-assessment/diagnosis. Many of the programs in the National Diffusion Network, especially the reading programs, are based on a diagnostic-prescriptive strategy. Hence the use of pre-assessment to determine the specific areas of remediation needed would be used.

Record-keeping is another element found in the diagnostic prescriptive

Table I

Origins of National Diffusion Network Configurations

Project Title	R.I.S.E.	DESSI Study	DC Facilitator
Knowledgeable Action to Restore the Environment		1	
Alphaphonics		1	
Individualized Language Arts	1	1	1
Pegasus-Pace			1
Precision Teaching	1		1
Sec. Learning Disability			1
Strategies in Early Childhood Education		1	
STAMM(Systematic Teaching and Measuring Mathematics)	1		1
ACTIVE		1	
Media Now			1
Programmed Tutorial Rdg./Utah		1	
Programmed Tutorial Rdg./Indiana		1	
Dale Avenue			1
Discovery Through Reading		1	
DEEP			1
Matteson IV-D		1	
Focus		1	
Priority ONE		1	
CATCH UP		1	
IPLE (Institute for Political & Legal Ed.)		1	
ECRI (Exemplary Center for Rdg. Instruction)		1	
EPSF (Early Prevention of School Failure)		1	1
EBCE (Experienced Based Career Education)		1	
VRP (Vocational Reading Power)		1	1
COPE (Cognitively Oriented PreKindergarten Ed.)		1	
Reading English Rotation		1	
APL (Adult Performance Level)	1		
Waterloo Follow Through	1		
Central Institute for the Deaf	1		
Teams Games Tournaments	1		
Occupational Versatility	1		
Reading Improvement, Secondary	1		
PATL (Positive Attitude Toward Learning)	1		

Table 2

Thrust of Components in Twenty NDN Configurations

Rank	Thrust	Frequency
1	Instructional Strategy	18
2	Pre-assessment/Diagnosis	14
3	Record Keeping	13
4	Materials	12
6	Student Grouping	7
5	Scheduling	8
7	Instructional Content	5
7	Testing	5
7	Facilities	5
8	Self Pacing	4
9	Parental Involvement	3
9	Management System	3

programs. This component was found to be third highest in frequency of use in the twenty configurations. It is required that programs approved by Joint Dissemination Review Panel have significant achievement. Often such record-keeping procedures were incorporated into the program for the adopter so that similar growth results could be verfied in the surrogate site.

Many of the National Diffusion Network programs produced their own instructional material or specified particular resources that must be used. Variations in the material component are more widespread than in those of instructional strategy, pre-assessment, or record-keeping which tend to be unique for a given program.

The components of lesser frequency such as student grouping and scheduling are for the most part program specific. If a certain program depends heavily on a unique instructional strategy, but may be presented individually, in small groups, or with the entire class at one time, the component of grouping is not significant. If, on the other hand, evidence of effectiveness is based on working with two or three children at a time, comparable results may not be gained with a group of five or six children. In this example, grouping is a critical component.

The remaining six components thrusts in Table 2 applied to less than 25% of the configurations reviewed. An additional fourteen components identified in the review were found in only one or two National Diffusion Network configurations.

Application of Configurations to NDN

The Pennsylvania State Facilitator uses the constructed configurations to assess the status of the implementation of an adopted National Diffusion Network (NDN) program. The configurations may be used as a tool in both an observational method and as the basis for description in the Levels of Use technique.

In the observation, the State Facilitator checks the configuration matrix as the observation proceeds. For example, in observing a second grade teacher using the Examplary Center for Reading Instruction (ECRI) technique, the Facilitator was able to scan the configuration and note the behaviors indicated. During the observation which took place over a two hour period, the absence or presence of the configuration behaviors were noted. It is not always possible to note all behaviors in a single lesson or even on a single day. A brief conference with the teacher could elicit self-reported information on the use or non-use of the components not observed.

Upon completion of the observation, the facilitator used the Levels of Use chart to determine at which level the teacher was functioning. Other data is added to the observational data to make this determination. For example, the facilitator had collected longitudinal data on the process of this adoption and knew that the teacher had been trained in August. It was also known that it had taken her two months to acclimate herself and her class to the management techniques and behavioral changes required in this program. From a brief conversation, the facilitator learned that on the component of materials, the teacher was making her charts and visuals on a day-to-day basis. She often stated that by next year she would have these already prepared and be more organized than she was now. The consideration of these data elements led the facilitator to assign a Level of Use III which is mechanical level for this adoption. For the facilitator's reporting needs to the U.S. Office of Education, it could be stated that this adoption was operating at a Level 2 in their nomenclature and was on its way to a Level 3. (See page 2 for the definitions of the Levels for National Diffusion Network reporting and the Appendix for a table on the Levels of Use of the Concerns Based Adoption Model (CBAM).

In addition to the determination of the status of the implementation, the

facilitator was also able to provide interventions to aid the teacher in overcoming some of the management concerns which were observed and realted in conversation. The teacher requested reinforcement for some of the instructional strategies she was using. A conference call with the certified ECRI trainer who resides in the state of Maine was set up for the following Friday. Aid in writing a proposal to the State Teachers Association for funding for additional training for this teacher was given in the form of a critique of the final version. The availability of chart stand which could accomodate charts and have storage for strips of papers, markers, and overlays is being investigated by the facilitator at the current time. This will make the use of charts an essential part of the instructional strategy component, less awkward and more facilitating for the teacher and the students.

The Levels of Use interview is more commonly used by the Pennsylvania State Facilitator than the observational technique for several reasons. These include the amount of time, twenty minutes as compared to two hours, and location. The LoU interview can be conducted over the telephone. The Facilitator prefers a face-to-face interview, but this is not always possible, particularly in light of travel costs.

In the 1979-80 school year, the Pennsylvania State Facilitator conducted twenty-six Levels of Use interviews. (See Table III). Sixteen configurations were utilized to determine the status of the implementation. Only two of the interviewees were found to be at non-use levels. One was prepared to implement and the other had not implemented the critical elements of the Demonstrator's program but instead had substituted their own. This is noted as a "drastic mutation" on the Table.

Table 3 indicates the method of interview, either face to face or by telephone and the length of time from the completion of training and the signing of

Table 3

1979-80

Pennsylvania State Facilitator - Levels of Use Data

Date	Format	Subject	Project	LoU	Comment
1979 Nov.	Face to Face	Teacher	Individualized Language Arts	III	Recent adopter.
Nov.	Face to Face	Teacher	"	II	" "
Nov.	Face to Face	Teacher	"	IV-A	Two-year adoption.
Nov.	Face to Face	Teacher	"	IV-A	Five-year adoption, certified trainer.
1980 Mar.	Face to Face	Teacher	STAMM	IV-B	Two-year adoption.
Mar.	Telephone	Teacher	Teams-Games-Tournament	IV-B	1-year adoption.
Mar.	Face to Face	Aide	Programmed Tutorial Reading	IV-A	1-year adoption.
Mar.	Face to Face	Coordinator	"	IV-A	1-year adoption, certified trainer.
Mar.	Face to Face	P.E. Tchr.	ACTIVE	IV-B	Special education - deaf two-year adoption.
Mar.	Face to Face	Coordinator	Central Institute for Deaf	IV-B	Two-year adoption, special education - deaf.
Mar.	Face to Face	Teacher	Individualized Language Arts	IV-A IV-A	6 months adopter.
Mar.	Face to Face	Teacher	Precision Teaching	IV-A	One-year adoption, special education.
April	Telephone	Teacher	Individualized Language Arts	III	One-year adoption.
April	Telephone	Teacher	Reading English Rotation	IV-B	One-year adoption.
Mar.	Telephone	Teacher	Occupational Versatility	IV-B	2-year adoption.
Mar.	Face to Face	Federal Programs Coord.	Reading Improvement	Drastic Mutation	2-year adoption.
Mar.	Face to Face	Teacher	PATL	IV-A	2-year adoption.
Mar.	Face to Face	Teacher	PATL	IV-A	2-year adoption.
Mar.	Face to Face	Teacher	PATL	III	2-year adoption.
April	Telephone	Teacher	Waterloo FT	III	1-year adoption.
May	Telephone	Teacher	ILA	IV-A	2-year adoption.
May	Telephone	Teacher	Precision Tchg.	III	1-year adoption.
May	Telephone	Director	APL	IV-A	2-year adoption.
April	Telephone	Teacher	KARE	III	1-year adoption.
April	Face to Face	Teacher	Matteson IV-D	IV-A	1-year adoption.
May	Telephone	Teacher	Alphaphonics	III	1-year adoption.

the adoption agreement. In most adoptions, the implementation was indicated as in place and operating smoothly. For some one-year adoptions, day to day planning and operation were noted. This is noted as Level III. The Appendix contains an explanation for each Level of Use.

In many cases the analysis of the interviews led to interventions which stabilized or improved the conditions for implementation. For example, several adopters of the Individualized Language Arts (ILA) program expressed a need for systematic method of evaluating written composition. On the basis of this finding, a meeting of adopters was convened to explore the writing assessment measure of holistic scoring. This year, two sessions of holistic scoring training will be available in the state for ILA adopters.

NDN Configuration Issues

There are several issues that have arisen with the use of configuration for assessing fidelity of implementation with NDN adopters.

One set of concerns centers on who should decide on the final configuration. Should this decision be entirely within the realm of the developers? Can the adopters make site modifications to critical components or just to related components of the configuration without risking invalidation of adopted programs? In the same area of concern, who decides how many components must be in place for an implementation to be considered in use? Is this a matter of degree or completeness?

A second set of concerns relates to dealing with a bundle of innovations in a single program. Should a configuration be developed for each element of the bundle as opposed to one macro configuration for the entire set? How are phased components handled? Is there such a thing as progressive fidelity of implementation?

No doubt, many of the resolutions to these concerns will be what best fits

a given situation. However, a minimum set of operating standards will be needed if the innovations configurations approach is widely used by facilitators and/or developers in the National Diffusion Network.

Application of Configurations to Developmental Programs

The experience in using configurations with NDN programs led the Pennsylvania State Facilitator to work with developmental programs in the areas of Title IV-C, Special Education and Vocational Education. Different types of problems are encountered with developmental programs. To begin with, they are still in most cases developing or evolving; they are testing which components work and which do not. The configuration constructed after the first year may be drastically different than the final configuration three years later.

In the ESEA Title IV-C experience, the program was in its second year of development. Lateral spread was beginning to operate as new teachers volunteered to try the program. The developer was concerned with fidelity of the program as it was taught in new sites throughout the district. A configuration of the program, an holistic reading approach, was constructed and used in the Levels of Use interviews. The results of the interviews revealed problems on the part of an experienced teacher who was considered for a trainer role in the program. A less experienced teacher was implementing successfully and feeling comfortable in the process. The developer decided to delay his training decisions until the problems of the experienced teacher could be remediated or a decision had been reached to seek other trainer candidates.

The Special Education experience had the concerns of the developmental programs and the additional problems of being a mandated program. Five counties in Maryland were implementing the revised federal regulations regarding the learning disabled. A configuration was constructed which incorporated the regulations and the variations which could be used to concur with the mandate.

Since this was a revision, there were components which had been in place for several years. Some innovative counties recognizing the needs had installed components before they were mandated. The configuration's components were assessed individually to determine the absence or presence of each. Levels of Use designations were determined as a result of the data. The outcome of this effort was a concerted effort to bring the weak components to a mechanical use level. Using this method, resources could be brought to bear on pin-pointed areas. This configuration will undergo the least modification of the three developmental programs due to the nature of requirement and mandate.

A Pennsylvania university had adopted a vocational education certification course from another state university. Their reason for wishing to construct a configuration was to point up the similarities and discrepancies between the original and the adopted programs. In so doing, the university hoped to disseminate and diffuse its own program even though the rudiments of the original program had been adopted and were incorporated into the second program. The adopter had enhanced the original program with components which were now considered critical hus a new program with significant student results was available for dissemination. This program contained a bundle of innovations, a series of mini-programs each with their own set of components. Although one large configuration was constructed, several smaller ones would have been more appropriate to the situation.

The configuration in a developmental program performs a documenting service. As the program goes through the testing phases, it is modified by keeping what works and discarding the rest. Therefore, a number of configurations could be constructed. Each one documents a period in time in the developmental history. Adopting districts who want to "adapt" or modify the original program can be provided with documentation as to why certain ineffective components are no longer in the configuration.

The documentation can also relate which components have remained or become critical while others were relegated to the related status.

Issues in Developmental Programs Configurations

Many of the issues raised in the NDN configuration issues section apply here. There are, however, unique ones encountered in developmental programs. For example, should a configuration be constructed for a developmental program? If so, is there a specific point in time to construct one? In a three year developmental project, should a configuration be attempted before or after the developmental period? In ESEA Title IV, fourth and fifth years are designated as opportunities for dissemination. Is this, then the appropriate time for a configuration?

Conclusion

At the present time, the National Diffusion Network is exploring the issue of implementation assessment. To date, two tools have been found which seem to measure implementation in regard to fidelity. These two measures, Levels of Use (CBAM) and Matrix Sampling both use a type of descriptive narrative on which to judge the status of the implemenation. The innovation configuration can serve both tools equally well as the basis for the description.

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